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Title: NETWORK TERMINAL OPERATED BY DOWNLOADABLE OPERATING SYSTEM AND OPERATING METHOD THEREOF

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IN THE CLAIMS

(Currently Amended) A network terminal operated by a downloadable operating system, 1. the network terminal comprising:

a power supply to supply for supplying a power to an element of the network terminal; a nonvolatile storage medium to store for storing a basic input/output system (BIOS) that automatically operates upon the supplying [[of]] the power;

a controller to be initialised by [[the]] operation of the BIOS in order to enable a connection between the network terminal and a host computer and downloading a download of a terminal operating system (OS) from the host computer to the network terminal; and

a volatile storage medium to store for storing the terminal OS downloaded from the host computer; and

a communication part to communicate with the host computer, wherein the terminal OS is to

transmit user inputs at the network terminal to the host computer for execution by an application program on the host computer; and receive execution results from the host computer for display.

(Currently Amended) The network terminal according to claim 1, further comprising: 2. a communication part to be connected with the host computer, for transmitting/receiving a data to/from the host computer;

an encoder for encoding the received data; and at least one input/output port to which at least one user interface is connected.

(Currently Amended) The network terminal according to claim 1, wherein the nonvolatile 3. storage medium is a ROM or a flash memory and the capacity of the nonvolatile storage medium is less than or equal to 512 KB or less for storing the BIOS.

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4. (Original) The network terminal according to claim 1, wherein the controller is implemented with a programmable SoC (system on a chip) instead of a CPU (central processing unit).

- 5. (Original) The network terminal according to claim 4, wherein the controller implemented with the SoC is re-initsalized by the terminal OS stored in the volatile storage medium.
- 6. (Currently Amended) The network terminal according to claim 1, wherein the volatile storage medium is used as a working memory and is implemented with <u>less than or equal to</u>
 [[an]] 8-MB RAM or less.
- 7. (Currently Amended) The network terminal according to claim 1, wherein each of the network terminal and the host computer is assigned a unique IP address to identify each other to establish communication between the host computer and the network terminal, for the connection therebetween.
- 8. (Original) The network terminal according to claim 1, wherein the nonvolatile storage medium stores a program enabling the network terminal to have a unique IP address.
- 9. (Original) The network terminal according to claim 2, wherein the at least one user interface includes a monitor, a keyboard, a mouse, a speaker, a microphone, a touch screen, a remote control, or other interfaces using a USB port, a serial port or a memory slot.
- 10. (Currently Amended) A method of operating a network terminal with a downloadable operating system, comprising the steps of:

supplying [[a]] power to a network terminal;

checking the network terminal and initializing a controller of the network terminal by

using a BIOS of the network terminal that is automatically executed upon [[the]] supplying [[of]] the power;

connecting the network terminal with a host computer through a network and downloading a terminal OS from the host computer to the network terminal, under control of the initialized controller;

storing the downloaded terminal OS in a volatile storage medium of the network terminal;

communicating a user input provided at the network terminal to the host computer; and executing the user input performing a network terminal user's manipulation at the host computer and transmitting receiving an execution a corresponding result from the host computer [[to]] at the network terminal.

- (Currently Amended) The method according to claim 10, further comprising the step of 11. re-initializing the controller with the terminal OS stored in the volatile storage medium prior to executing the user input the step of performing a network terminal a user's manipulation at the host computer.
- (Original) The method according to claim 11, wherein the controller is implemented with 12. a programmable SoC instead of a CPU.
- (Currently Amended) The method according to claim 10, further comprising the step of 13. running the host computer and connecting the host computer [[on]] to the network prior to the step of supplying [[a]] the power.
- (Currently Amended) The method according to claim 13, wherein the host computer is 14. provided with the terminal OS for an operation of the terminal network as well as an OS for [[its]] operation of the host computer.

15. (Currently Amended) The method according to claim 10, wherein each of the network terminal and the host computer is assigned a unique IP address to identify each other <u>to establish communication between the host computer and the network terminal</u>, for the connection therebetween.

16. (Currently Amended) The method according to claim 10, wherein executing the user input the step of performing the user's manipulation includes the steps of:

transmitting a screen background of the host computer in the form of a bitmap image to the network terminal and displaying the transmitted screen background on a monitor [[of]] connectable to the network terminal; and

executing an application program of the host computer according to the <u>user input</u> network terminal user's manipulation, transmitting <u>an execution result a result of the execution</u> in the form of a bitmap image to the network terminal, and <u>providing the displaying</u> the transmitted bitmap image to [[on]] the monitor <u>connectable to [[of]]</u> the network terminal.

- 17. (Currently Amended) The method according to claim 16, wherein each of the bitmap images is a 8 bit format or 16 bit format bitmap image and a simple authentication procedure is optionally employed at when either step of transmitting the bitmap image.
- 18. (Currently Amended) The method according to claim 16, wherein <u>a</u> display area and colors of the monitor are adjustable upon a user's demand.
- 19. (New) The network terminal according to claim 1, further comprising an I/O port connectable to a monitor, and wherein the execution results include an image and the terminal OS provides the image to the I/O port.
- 20. (New) The network terminal of claim 1, wherein all applications programs are provided on the host computer and all user inputs for an application program are transmitted to the host

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computer for execution on the host computer.

- 21. (New) The network terminal according to claim 1, wherein the volatile and non-volatile memory of the network terminal excludes any application programs, the terminal OS being to communicate user input to the host computer where the application programs are provided.
- 22. (New) A system comprising;
 - a host computer including
 - a plurality of application programs;
 - an operating system to run the application programs; and
 - a terminal operating system (OS);
- a plurality of network terminals, each network terminal requiring the terminal OS to operate; and
- a network to connect the plurality of network terminals to the host computer, wherein each network terminal comprises:
 - a power supply to supply power to an element of the network terminal;
- a nonvolatile storage medium to store a basic input/output system (BIOS) that automatically operates upon supplying the power;
- a controller to be initialized by operation of the BIOS to enable a connection between the network terminal and the host computer and downloading the terminal OS from the host computer to the network terminal;
- a volatile storage medium to store the terminal OS downloaded from the host computer; and
- a communication part to communicate with the host computer, wherein the terminal OS is to

transmit user inputs at the network terminal to the host computer for execution by the application programs, the applications programs being stored and executed only at the host computer; and

receive images including execution results from the host computer for display.

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23. (New) The network terminal according to claim 22, further comprising an I/O port connectable to a monitor, and wherein the execution results include an image and the terminal OS provides the image to the I/O port.

24. (New) A method comprising:

executing a basic input/output system (BIOS) automatically upon powering up a network terminal device, the BIOS establishing a network connection to a host computer;

receiving a terminal operating system (OS) from the host computer and running the terminal OS on the network terminal;

under control of the terminal OS, communicating all user inputs requiring execution by an application program, the applications program being stored and executed only at the host computer;

receiving images including execution results from the host computer; and providing the execution results to a monitor for display, the monitor being connectable to the network terminal.

- 25. (New) The method according to claim 24, wherein the images are bit map images.
- 26. (New) The method according to claim 24, wherein the terminal OS is stored in and run from volatile memory of the network terminal and operates on the network terminal independently of a processor.